

United States Court of Appeals for the Federal Circuit

2010-1235

HOLOGIC, INC., CYTYC CORPORATION,
and HOLOGIC L.P.,

Plaintiffs-Appellants,

v.

SENORX, INC.,

Defendant-Appellee.

Judgment

ON APPEAL from the UNITED STATES DISTRICT COURT FOR THE
NORTHERN DISTRICT OF CALIFORNIA

in CASE NO(S). 08-CV-0133

This CAUSE having been heard and considered, it is

ORDERED and ADJUDGED:

REVERSED AND REMANDED

ENTERED BY ORDER OF THE COURT

DATED FEB 24 2011

Jan Horbaly

Jan Horbaly, Clerk

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UNITED STATES COURT OF APPEALS
FOR THE FEDERAL CIRCUIT

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HOLOGIC, INC., CYTYC CORPORATION,
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Plaintiffs-Appellants,

v.

SENORX, INC.,
Defendant-Appellee.

2010-1235

Appeal from the United States District Court for the
Northern District of California in Case No. 08-CV-0133,
Senior Judge Ronald M. Whyte.

Decided: February 24, 2011

MATTHEW M. WOLF, Howrey, LLP, of Washington, DC,
argued for the plaintiffs-appellants. With him on the
brief was JOHN E. NILSSON.

KANNON K. SHANMUGAM, Williams & Connolly, LLP,
of Washington, DC, argued for the defendant-appellee.
With him on the brief were BRUCE R. GENDERSON, AARON
P. MAURER and ADAM D. HARBER.

HOLOGIC v. SENORX

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Before NEWMAN, FRIEDMAN, and LOURIE, *Circuit Judges*.

Opinion for the court filed by *Circuit Judge* LOURIE.

Opinion dubitante filed by *Circuit Judge* FRIEDMAN.

LOURIE, *Circuit Judge*.

Hologic, Inc., Cytoc Corp., and Hologic L.P. (collectively "Hologic") appeal from the decision of the United States District Court for the Northern District of California granting summary judgment of invalidity of claim 1 of U.S. Patent 6,482,142 (the "'142 patent"), *Hologic, Inc. v. SenoRx, Inc.*, 08-CV-0133 (N.D. Cal. Oct. 30, 2009) ("*Summary Judgment Op.*"), and from the judgment following a jury verdict of invalidity of claim 8 of the '142 patent that was based on the court's ruling regarding claim 1, *Hologic, Inc. v. SenoRx, Inc.*, 08-CV-0133 (N.D. Cal. Feb. 24, 2010). Because the district court's invalidity finding was based on an erroneous claim construction, we reverse and remand.

BACKGROUND

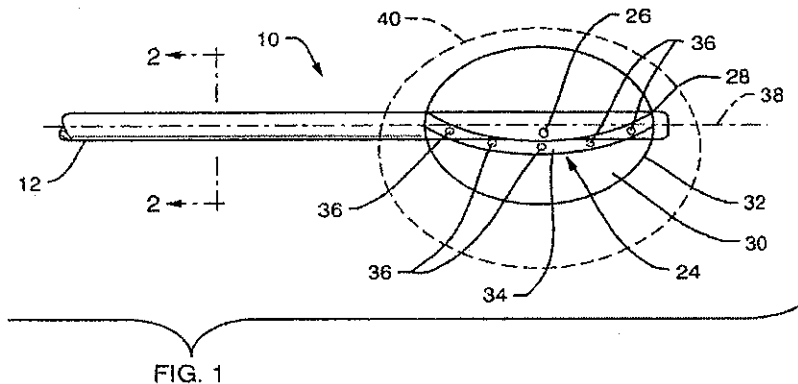
I.

The relevant technology relates to balloon brachytherapy, a type of radiation therapy in which a balloon is inserted into the body at or near a tumor or other proliferative tissue disease site. Leading up to the balloon and running through it is a lumen, through which a radiation source may be placed in the balloon. Early uses of balloon brachytherapy included treatment of bladder cancer. In such applications, the devices were placed within existing body cavities. Balloon brachytherapy may also be used after the removal of a tumor by inserting the device into the cavity that remains from tumor removal to target any remaining cancerous tissue while minimizing damage to healthy tissue. This usage is contemplated by the '142

patent and its parent patents, and is used in the accused device, as discussed further below.

The '142 patent is a continuation-in-part of U.S. Patent 6,413,204 (the "204 patent"), which is in turn a continuation-in-part of U.S. Patent 5,913,813 (the "813 patent").¹ Those patents explain that benefits of balloon brachytherapy include the ability to avoid exposing tissue immediately surrounding a radiation source from overly intense radiation and the delivery of more uniform radiation, both of which are achieved by virtue of spacing the source away from the target tissue, within the balloon. '813 patent col.3 ll.14-38. The '142 patent discloses a balloon brachytherapy device with a "means for providing predetermined asymmetric isodose profile [sic.] within the target tissue." '142 patent col.2 ll.62-64. Various embodiments are described for obtaining this result, including placing an inner balloon filled with a liquid radiation source within the larger balloon, *id.* col.3 ll.1-6, arranging various solid radiation sources within the balloon, *id.* col.3 ll.7-19, and the use of radiation shielding material within the balloon, *id.* col.3 ll.20-36. Isodose curves are shown in figures depicting the radiation devices; these curves illustrate the points at which a given amount of radiation is received. Figure 1 of the '142 patent is illustrative of a relevant embodiment of the claimed invention, showing a tube (12) proceeding along a longitudinal axis (38) through a balloon (32), and radiation sources (36) placed along a curved wire (34), also within the balloon, that create asymmetric isodose curves (*e.g.*, 40). *Id.* col.4 ll.27-59.

1 All three patents were asserted in the district court. However, Hologic did not appeal the jury's finding that claim 4 of the '204 patent was invalid and did not assert the '813 patent at trial. Thus, they are not before us on appeal.



This appeal involves claims 1 and 8 of the '142 patent. Independent claim 1 reads as follows:

An interstitial brachytherapy apparatus for treating target tissue surrounding a surgical extraction comprising: *an expandable outer surface* defining a three-dimensional apparatus volume configured to fill an interstitial void created by the surgical extraction of diseased tissue and define an inner boundary of the target tissue being treated; a radiation source disposed completely within the expandable outer surface and located so as to be spaced apart from the apparatus volume, the radiation source further being *asymmetrically located and arranged within the expandable surface to provide predetermined asymmetric isodose curves with respect to the apparatus volume.*

Id. col.8 l.61–col.9 l.6 (emphases added). Claim 6, which the district court found relevant to its claim construction, reads:

A surgical apparatus for providing radiation treatment to target tissue comprising: an expandable outer surface defining an apparatus volume;

a radiation source replaceably disposable within the expandable outer surface, the radiation source comprising a plurality of solid radiation sources arranged to provide predetermined asymmetric isodose curves within the target tissue, the plurality of radiation sources being provided on at least two elongate members extending into the apparatus volume, *at least one of the elongate members being shaped to provide asymmetric placement of a radiation source with respect to a longitudinal axis through the apparatus volume.*

Id. col.9 l.45–col.10 l.9 (emphasis added). Claim 8, which depends from claim 1, reads:

The apparatus of claim 1, wherein the expandable outer surface is sufficiently rigid to deform the target tissue into the shape of the expandable outer surface, causing the *predetermined asymmetric isodose curves* to penetrate into the target tissue to a prescribed depth.

Id. col.10 ll.13-17 (emphasis added).

Prior art in the field is also relevant to the appeal. A 1990 article described the use of endotracheal tubes to deliver radiation following the removal of brain tumors. R.D. Ashpole *et al.*, *A New Technique of Brachytherapy for Malignant Gliomas with Caesium-137: A New Method for Utilizing a Remote Afterloading System*, 2 Clinical Oncology 333, 333-37 (1990) (“Ashpole”). Ashpole describes a method of delivering radiation to cancer cells remaining in surrounding tissue after tumor removal. Ashpole at 334. The Ashpole device is described as having a balloon at one end of a catheter which allows for a “source train” of radioactive beads to be introduced into the balloon. The article explains that “[a] certain measure of dosimetric versatility is possible in that positions of the active

beads can be changed to produce an isodose distribution specific to the geometry of the individual tumour beds." *Id.* at 336. There is no disclosure of positioning the beads away from the longitudinal axis of the balloon, because they are introduced by way of the catheter that defines that axis. However, Ashpole appears to contemplate isodose curves that are non-concentric with the balloon by movement of the source train along the longitudinal axis. *Summary Judgment Op.* at 13-14 (summarizing Ashpole reference and parties' agreement on its disclosure regarding isodose curves).

The prior art also includes a European patent application, WO 98/15315 ("Williams"), drawn to devices for treatment of proliferative disorders by using a small balloon of a liquid radiation source within a larger balloon. The application focuses on providing the radiation material to the inner balloon and the shape of the balloon. Figure 3 of that reference is reproduced below:

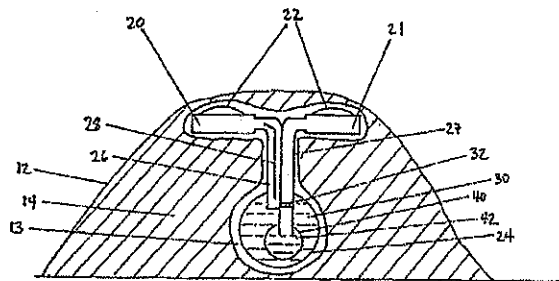


Figure 3

II.

Hologic brought suit against SenoRx, Inc. ("SenoRx") in January 2008, alleging that SenoRx's balloon brachytherapy device, the Contura Multi-Lumen Balloon ("Contura") infringes its patents. SenoRx conceded infringement of claims 1 and 8 of the '142 patent, *see Summary Judgment Op.* at 28, but argued that the asserted claims were invalid. The court held a hearing and issued its claim construction order in February 2009. *Hologic, Inc. v. SenoRx, Inc.*, 2009 WL 416571 (N.D. Cal. 2009) ("*Markman Op.*"). The court construed the language in claim 1, "the radiation source further being asymmetrically located and arranged within the expandable surface to provide predetermined asymmetric isodose curves with respect to the apparatus volume," to require that the radiation source be "located and arranged inside the expandable surface so as not to be concentric with the expandable outer surface," and did not limit the claimed asymmetry to asymmetry about the longitudinal axis. *Id.* at *17. The court similarly construed "predetermined asymmetric isodose curves" in both claims to mean "isodose curves determined before radiation is administered which are not substantially the same shape as the apparatus volume and/or not concentric with the apparatus volume." *Id.* The court thus rejected Hologic's proposed claim construction of "predetermined isodose curves that are not symmetric with respect to the longitudinal axis of the apparatus volume." In rejecting Hologic's construction, the court stated that "although the specification and claims frequently refer to asymmetry with respect to the longitudinal axis, they do not always do so." *Id.* at *11. The court also found persuasive the fact that claim 6 of the '142 patent includes a requirement that the asymmetry be longitudinal, in contrast to the asserted claims, which do not contain that term. *Id.*

The district court denied a motion for summary judgment of invalidity of claim 1 of the '142 patent based on inoperability. *Hologic, Inc. v. SenoRx, Inc.*, 2009 WL 416596 (N.D. Cal. 2009). The court found that the language of claim 1 requiring a radiation source disposed completely within the expandable outer surface but also spaced apart from the apparatus volume did not render the claim inoperable and not enabled, although its initial reaction was "that the inventors made an obvious mistake in the drafting of Claim 1." *Id.* at *2. The court noted that the apparent, intended meaning of the claim was that the source was located within the balloon but spaced apart from its surface. The court further noted that in correspondence with the PTO during prosecution history, the applicants stated:

For example, the expandable outer surface of claims 1 and 9 defines a three-dimensional apparatus volume configured to fill an interstitial void created by the surgical extraction of diseased tissue and define an inner boundary of the target tissue being treated.... Furthermore, *the radiation source is disposed completely within the expandable surface and is spaced apart from the apparatus volume....* That is, the radiation source is arranged within the device so that the asymmetric dosing appears at the apparatus volume, which is configured to correspond to the interstitial void created by surgical extraction of diseased tissue.

Id. at *3. Thus, the language used to describe the invention in correspondence with the examiner was identical to the later used claim language, and clearly envisioned a source located within the balloon but spaced apart from its surface. The court concluded that although "apparatus volume" was "an odd choice of language to describe what the inventor intended to describe, its use was consistent

in the claim, in accordance with use in the prosecution history, and it results in coverage of the embodiments disclosed.” *Id.* at *4.

Based on its constructions, the district court then granted summary judgment of invalidity of claim 1 of the ’142 patent, as anticipated by the prior art Ashpole article. *Summary Judgment Op.* In so doing, the court found that Ashpole disclosed predetermined, asymmetric isodose curves like those in claim 1 of the ’142 patent. *Id.* at 13-14. However, the court found that Ashpole did not clearly and convincingly disclose claim 8’s requirement that the expandable outer surface be sufficiently rigid to deform the target tissue into the shape of the expandable outer surface, and therefore denied summary judgment as to anticipation of that claim. *Id.* at 14. At trial, Hologic asserted dependent claim 8 of the ’142 patent. The court instructed the jury that the “asymmetrically located and arranged” limitation and the “predetermined asymmetric isodose curve” limitation of claim 1 had been found in the prior art. J.A. 6561-62. The jury then found that the Ashpole reference alone rendered claim 8 anticipated, and Williams, *inter alia*, rendered claim 8 obvious in light of Ashpole and the court entered judgment in favor of SenoRx. *Hologic, Inc. v. SenoRx, Inc.*, 08-CV-0133 (N.D. Cal. Feb. 24, 2010).

Hologic appealed. We have jurisdiction pursuant to 28 U.S.C. § 1295(a)(1).

DISCUSSION

We review a district court’s decision on summary judgment *de novo*, reapplying the same standard applied by the district court. *Iovate Health Scis., Inc. v. Bio-Engineered Supplements & Nutrition, Inc.*, 586 F.3d 1376, 1380 (Fed. Cir. 2009). Summary judgment is appropriate “if the movant shows that there is no genuine dispute as

to any material fact and the movant is entitled to judgment as a matter of law.” Fed. R. Civ. P. 56(a). Claim construction is an issue of law, which we review *de novo*. See, e.g., *Cyber Corp. v. FAS Techs.*, 138 F.3d 1448, 1456 (Fed. Cir. 1998) (*en banc*). A patent is presumed valid, 35 U.S.C. § 282, and this presumption can be overcome only by clear and convincing evidence to the contrary. *Bristol-Myers Squibb Co. v. Ben Venue Labs., Inc.*, 246 F.3d 1368, 1374 (Fed. Cir. 2001).

Hologic argues that the district court erred by failing to limit claim 1 to situations in which asymmetry is achieved by displacing the radiation source from the longitudinal axis. According to Hologic, because the claim language does not resolve the nature of the asymmetry, the court must look to the '142 patent's specification, which shows that radiation is always asymmetrically located with respect to the longitudinal axis. Hologic then argues that requiring the isodose curves to be non-concentric with respect to the balloon would read out the preferred embodiment and many other embodiments from the specification. The specification, argues Hologic, consistently characterizes asymmetry relative only to the longitudinal axis. Hologic also points to statements made during prosecution history as helpful in construction. In overcoming an obviousness rejection in view of U.S. Patent 6,036,631 (“McGrath”), Hologic explained that what issued as claim 1 could be distinguished from McGrath in part because “McGrath provides an x-ray tube [] that slides within a catheter . . . ‘essentially forming a linear source,’” J.A. 10185, rather than providing an asymmetric dose.

Hologic also challenged the district court's construction for differentiating between independent claim 1 and independent claim 6, which claims a lumen “shaped to provide asymmetric placement of a radiation source with

respect to a longitudinal axis through the apparatus volume." '142 patent col.10 ll.6-9. Hologic argues that claim differentiation is only proper between an independent claim and those claims that depend from it. Hologic explains that, in contrast to claim 6, claim 1 was not specifically drawn to the embodiments with multiple radiation sources, thus obviating the need to explain that at least one of the lumens was shaped so as to be asymmetric with the longitudinal axis. Hologic responds to SenoRx's suggestion that Hologic's construction was inconsistent with the embodiments shown in figures 3 and 3A by arguing that those figures are also drawn to an embodiment with multiple radiation sources, and thus are not implicated by claim 1. Hologic further argues that the isodose curves produced by those configurations are asymmetric about the longitudinal axis.

SenoRx argues that the claim language is clear that the contemplated asymmetry is with respect to the balloon's volume and that there is no reason to import limitations from the specification. SenoRx further argues that an asymmetric dose is one that is not substantially uniform in substantially every direction, and that it follows from this construction that the patent discloses radiation sources offset from the center of the balloon. In any case, argues SenoRx, the specification supports the district court's construction by giving an example that does not specify an axis with respect to which the radiation source is asymmetrically placed, both in the text, which describes an example without using the phrase "longitudinal axis," '142 patent col.3 ll.8-10, and in figures 3 and 3A. Those figures, according to SenoRx, show placement of radiation sources that form asymmetric isodose curves with respect to the apparatus volume, as described in claim 1, but are not asymmetrically located with respect to the longitudinal axis. In addition, SenoRx argues that the district

court properly looked to other claims in finding that claim 1 could have, but did not, refer to asymmetry with respect to the longitudinal axis. SenoRx further argues that the prosecution history is not informative and the statements relied upon by Hologic do not distinguish McGrath on the basis of longitudinal asymmetry.

SenoRx also argues that even under Hologic's proposed claim construction, claim 1 is invalid as anticipated in light of Williams, which includes a figure that SenoRx contends is asymmetric with respect to the longitudinal axis of the outer balloon. In addition, SenoRx revives its argument that claim 1 is invalid as inoperable and not enabled. Specifically, SenoRx argues that the requirement of "a radiation source disposed completely within the expandable outer surface and located so as to be spaced apart from the apparatus volume" is impossible because the radiation source cannot be inside the volume and spaced apart from it.

We agree with Hologic that the phrase "asymmetrically located and arranged within the expandable surface" means "located and arranged so as not to be on the longitudinal axis of the expandable surface." Although the claim concludes with the phrase "with respect to the apparatus volume," '142 patent col.9 l.6, that language explains the asymmetry of the predetermined isodose curves, as discussed further, below. The asymmetry of the location of the radiation sources is not explicitly stated in claim 1. However, asymmetry is a relative concept that can only exist in relation to some reference. Although "the claims of a patent define the invention to which the patentee is entitled the right to exclude," we must read the claims "in view of the specification, of which they are a part." *Phillips v. AWH Corp.*, 415 F.3d 1303, 1312-14 (Fed. Cir. 2005) (*en banc*) (quotations omitted); *Vitronics Corp. v. Conception, Inc.*, 90 F.3d

1576, 1582 (Fed. Cir. 1996) (“[I]n interpreting an asserted claim, the court should look first to the intrinsic evidence of record, *i.e.*, the patent itself, including the claims, the specification and, if in evidence, the prosecution history.”). Here, claim 1 does not specify a reference for the asymmetry of the radiation source’s placement within the expandable surface; however, the specification makes clear what the inventors contemplated as their invention. All the descriptions of the invention contemplating the placement of a radiation source describe displacement from the longitudinal axis of the balloon. For example, the summary of the invention describes the configurations contemplated by the inventors:

In one configuration, asymmetric isodose curves are created . . . by . . . locating the radiation source so as to be asymmetrically placed *with respect to a longitudinal axis of the apparatus*. In one example . . . an inner volume containing a liquid radioisotope is asymmetrically placed within the apparatus volume *so as to result in an isodose profile in the target tissue that is asymmetric about the longitudinal axis of the apparatus*.

’142 patent col.2 l.65-col.3 l.6 (emphases added).

This description explains how the radiation source may be asymmetrically placed in relation to the longitudinal axis of the device, and how such placement will create isodose curves that are also asymmetric with respect to the longitudinal axis. One particular sentence was relied upon by the district court because it does not specify asymmetry about the longitudinal axis—in fact, it does not specify any reference in describing its asymmetry. *Id.* col.3 ll.7-10 (“In another example, the radiation source comprises a plurality of spaced apart solid radioactive particles disposed within the apparatus volume and

arranged to provide a predetermined asymmetric isodose curve within the target tissue.”). However, the sentence is followed directly and in the same paragraph by two “particular examples,” both of which specifically dictate asymmetry of the location of radiation about the longitudinal axis:

In one particular example, the plurality of spaced apart radioactive particles are provided on a single elongate member that is shaped so that *some of the radioactive particles are farther from the longitudinal axis of the apparatus than others*. In other particular examples, a plurality of members carrying radioactive particles are provided with at least one of the members being shaped so as to *place at least one radioactive particle asymmetrically with respect to the longitudinal axis of the apparatus*.

Id. col.3 ll.11-19 (emphases added).

It thus appears that the first sentence of the paragraph is not a deviation from the rest of the specification, which contemplates different ways of arranging radiation sources asymmetrically about the longitudinal axis and of achieving isodose curves that are asymmetric about the longitudinal axis or with respect to the volume of the apparatus. Rather, the relied-upon sentence is a prelude to two descriptions of asymmetry about the longitudinal axis. The rest of the specification is consistent with this reading. *Id.* col.5 ll.11-14 (“Radiation source 24 has an asymmetric configuration with respect to a longitudinal axis 38 of the instrument 10. That is, radiation source 24 is shaped so as to result in an isodose profile 40 that varies radially about the longitudinal axis 38.”); *id.* col.6 ll. 25-29 (“[T]his device specifically alters the isodose profile for applications where particularly sensitive tissue

or other concerns result in a desire to limit the dosage on one or more sides of the device"); *id.* col.7 ll.5-7 ("The inner surface 106 is asymmetrically shaped or located with respect to the longitudinal axis 110 of the device 100").

The district court also looked to other claims to determine the meaning of the disputed terms. *Markman Op.* 2009 WL 416571, at *11. We have explained that other claims "can also be valuable sources of enlightenment as to the meaning of a claim term." *Phillips*, 415 F.3d at 1314 (citing *Vitronics*, 90 F.3d at 1582). Hologic wrongly asserts that looking to other terms is only appropriate when the comparison is between an independent claim and the claims that depend from it. Although that may be an instance where examination of other claims is worthwhile, *Phillips*, 415 F.3d at 1314-15, it is not the only one.

Here, claim 6 specifically refers to a "plurality of radiation sources being provided on at least two elongate members extending into the apparatus volume, at least one of the elongate members being shaped to provide asymmetric placement of a radiation source with respect to a longitudinal axis through the apparatus volume." '142 patent col.10 ll.3-9. Thus, the claim is specific in requiring at least one of the elongate members to be asymmetric about the longitudinal axis. As Hologic notes, however, claim 6 is drawn to a "plurality of radiation sources," and allows for some of those sources to be on the longitudinal axis, while some are displaced by the changed shape of at least one of the "elongate members" or lumens. *Id.* This contrasts with claim 1, which claims merely "a radiation source," does not mention "elongate members," and therefore may require less specificity in explaining shape and location of sources with respect to each other. As we have explained, "[d]ifferent terms or

phrases in separate claims may be construed to cover the same subject matter where the written description and prosecution history indicate that such a reading . . . is proper." *Nystrom v. TREX Co.*, 424 F.3d 1136, 1143 (Fed. Cir. 2005). In any case, the claims are worded sufficiently differently that there is no indication that this particular difference should result in an entirely different reading of the asymmetry of the radiation source in claim 1 that is not called for by the plain language of the claim and is not otherwise supported by the specification.

Moreover, no other claim, independent or dependent, contains a specific limitation that the radiation source is symmetric with respect to the longitudinal axis. If, as SenoRx maintains, the specification supports that interpretation, its argument is not backed up by any claim that recites the only other alternative to an asymmetric source, *viz.*, a radiation source that is symmetric with respect to the longitudinal axis.

SenoRx's argument that figures 3 and 3A show asymmetry with respect to the apparatus volume but not with respect to the longitudinal axis is also not convincing. Those figures show a central lumen with a plurality of radiation sources (52), some of which are located along the longitudinal axis; there are also two lumens bent away from the axis that bear radiation sources (52) at their ends. Figure 3 shows a side view, with the longitudinal axis proceeding left to right, while figure 3A shows a view along the longitudinal axis:

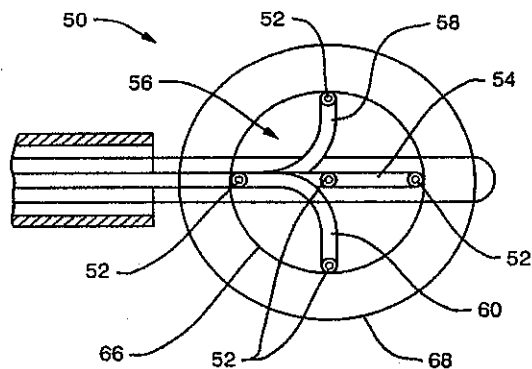


FIG. 3

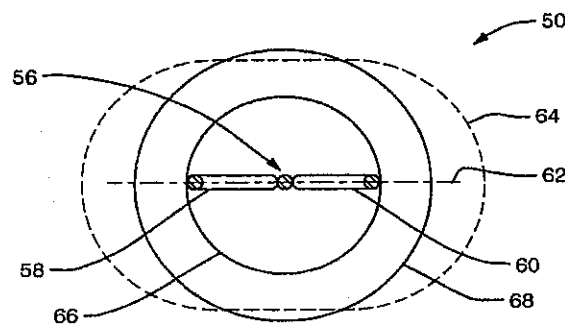


FIG. 3A

As explained by the district court, however, the resulting isodose curve (64) is not symmetric about the longitudinal axis as posited by SenoRx. (Nor, for that matter, are the radiation sources (52); rather, they are symmetric about a plane defined by the longitudinal axis and an axis along the dotted line (62) in figure 3A). *Markman Op.* 2009 WL 416571 at *11. Because the specification, including the figures, consistently and exclusively shows radiation sources located asymmetrically about the longitudinal axis, and because that is clearly what the inventors of the '142 patent conceived of, claim 1 is properly construed as referencing radiation sources that are lo-

cated and arranged so as not to be on the longitudinal axis of the expandable surface.

Although as properly construed, claim 1 is drawn to a radiation source that is asymmetric with respect to the longitudinal axis of the expandable surface, the limitation does not necessarily apply to the predetermined isodose curves, which are specifically dictated by the claim language to be asymmetric "with respect to the apparatus volume." That construction was not specifically appealed to us and we take no view upon it here. We do note that the practical implications of the distinction may be minimal, as the longitudinal asymmetry of the radiation source may, by necessity, result in asymmetry of the isodose curves with respect to the longitudinal axis.

We are also not persuaded by SenoRx's argument in the alternative that even under Hologic's proposed claim construction, the '412 patent would be invalid as anticipated by Williams. Williams does not disclose asymmetry about a longitudinal axis in order to create asymmetric isodose curves. SenoRx relies entirely on figure 3 of Williams; however, that figure does not clearly show asymmetry about the longitudinal axis. We decline, on appeal, to find that a single, hand drawn figure in a patent unrelated to asymmetric placement of radiation sources offers clear and convincing evidence of invalidity, as a matter of law.

We agree with the district court's refusal of summary judgment that claim 1 is invalid as inoperable and not enabled. We find the district court's reasoning in its denial of summary judgment persuasive. *See Hologic*, 2009 WL 416596. The court correctly noted that "although 'apparatus volume' was an odd choice of language to describe what the inventor intended to describe, its use was consistent in the claim, in accordance with use in the

prosecution history, and it results in coverage of the embodiments disclosed." *Id.* at *4.

Because the jury's finding of invalidity of claim 8 was predicated on the erroneous claim construction of claim 1, that judgment also cannot stand.

CONCLUSION

For the foregoing reasons, we reverse the district court's grant of summary judgment of invalidity of claim 1 of the '142 patent, and the district court's judgment of invalidity of claim 8 of the '142 patent and remand for further proceedings consistent with this judgment.

REVERSED and REMANDED

COSTS

Costs to Hologic.

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UNITED STATES COURT OF APPEALS
FOR THE FEDERAL CIRCUIT

By:  Date: 5/3/11

United States Court of Appeals for the Federal Circuit

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2010-1235

Appeal from the United States District Court for the
Northern District of California in Case No. 08-CV-0133,
Senior Judge Ronald M. Whyte.

FRIEDMAN, *Circuit Judge, dubitante:*

There is no suggestion, or even hint, in the technical language of claim 1 of the '142 patent that its phrase "asymmetrically located and arranged within the expandable surface" means, as the court holds, "located and arranged so as not to be on the longitudinal axis of the expandable surface." The court accomplished this construction of the patent language primarily by incorporating into that language the "longitudinal axis" limitation that is stated several times in the specification.

If that were all this case involved, I probably would join the opinion.

HOLOGIC v. SENORX

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But there is much more here that sheds light on the meaning of this language in claim 1. Two of the other independent claims – claims 2 and 6 – explicitly refer to “solid radiation sources,” or “a radiation source,” followed in each case by the words “with respect to a longitudinal axis through the apparatus volume.” The use of the term “a longitudinal axis” in these two claims shows that when the patentee wanted the claim to include that limitation, he knew how to do so, *i.e.*, by explicitly including those words. To me, these facts indicate that, had he intended claim 1 also to include that limitation, he would have explicitly included that language in that claim, as he did in claim 2 and 6, but not in claim 1 or the other two independent claims.

In short, it seems to me that the district court correctly construed claim 1 as not including the “longitudinal axis” limitation.

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UNITED STATES COURT OF APPEALS
FOR THE FEDERAL CIRCUIT

By:  Date: 7/3/11

Form 24

FORM 24. Bill of Costs

BILL OF COSTS (File original and three copies with the Clerk within 14 days of judgment.)

Docket No(s): A: 2010-1235 Caption: B: Hologic v. SenoRxThe Clerk is requested to tax the following costs against: C: SenoRx, Inc.

ITEM	Number of copies	Number of pages	Actual cost	Allowable cost	Total billed	Total taxed
Docketing Fee (if paid in this court)	xxxxx	xxxxx	D: 455.00			0
Table of Designated Materials (original)	xxxxx	E: 7	F:	6.00	42.00	42.00
Table of Compilation of Designated Materials (copying and collating)	G: 2	H: 7004		0.08	1120.64	1120.64
Brief (original)	xxxxx	E: 111		6.00	666.00	666.00
Brief (cover and binding)	G: 16	xxxxx		2.00	32.00	32.00
Brief (copying and collating)	G: 16	H: 111		0.08	142.08	142.08
Appendix (original - table of contents)	xxxxx	E: 5		6.00	30.00	30.00
Appendix (covers and binding)	G: 16	xxxxx		2.00	32.00	32.00
Appendix (copying and collating)	G: 16	H: 1289		0.08	1649.92	1649.92
Reply Brief (original)	xxxxx	E: 34		6.00	204.00	204.00
Reply Brief (covers and binding)	G: 16	xxxxx		2.00	32.00	32.00
Reply Brief (copying and collating)	G: 16	H: 34		0.08	43.52	43.52
Other (describe):	I:	J:			3994.16	3994.16
GRAND TOTALS					3994.16	3994.16

City/County of _____) District/State of Columbia) SSI, K. Matthew M. Wolf

necessarily performed. Itemized statements of the costs incurred or invoices are attached. Copies of this bill were served on all parties. The certificate of service is attached.

Signature: _____

Date: 3-10-11Attorney for: L. and Hologic, Inc.

Hologic, Inc., Cytyc Corp.,

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UNITED STATES COURT OF APPEALS
 FOR THE FEDERAL CIRCUIT

By: [Signature] Date: 5/3/11

HOWREY
1299 Pennsylvania Ave. N.W.
Washington, DC 20004-2402

07/29/2010

1101019685 / 2000040652

101558

BYRON S. ADAMS
1615 L STREET, NW, STE 100
WASHINGTON DC 20036

USD *****1,585.22*

Please use check number 1101019685 to clear the items listed below on Howrey account 101558.

Invoice #	Our Doc.#	Invoice date	Amount	Comments
025811	1900052850	05/10/2010	1,585.22	
Total		USD	1,585.22	

MAILED

JUL 30 2010

BY _____

TERMS OF SALE: Net 30. A monthly finance charge of 1.5% (18% Annum) applies to any up unpaid balance 30 days from date of invoice.

HOWREY
1299 Pennsylvania Ave. N.W.
Washington, DC 20004-2402

10/08/2010

1101023202 / 2000050722

101558

BYRON S. ADAMS
1615 L STREET, NW, STE 100
WASHINGTON DC 20036

USD *****768.48*

Please use check number 1101023202 to clear the items listed below on Howrey account 101558.

Invoice #	Our Doc.#	Invoice date	Amount	Comments
026201	1900065027	08/20/2010	768.48	
Total			USD 768.48	

RECEIVED
OCT 11 2010

byron s. adams

1615 L Street N.W. #100
Washington, DC 20036

Corp. ID: 52-1335902
Voice: (202) 347-8203
Fax: (202) 887-7011

Invoice

Invoice Number:
026201

Invoice Date:
2/20/10

Page:
1

Client: HOWREY LLP
1299 PENNSYLVANIA AVENUE, NW
WASHINGTON, DC 20004

Re: HOLOGIC, INC., CYTYC CORPORATION, & HOLOGIC L.P, Plaintiff
-Appellants, v. SENORX, INC.,

BILL MANDAFRO

Client ID: HOWREY

Client PO	Payment Terms	Contact	Due Date
13926	Net 30 Days	BILL MANDAFRO	9/19/10
For Printing Services			Amount
30 copies - United States Court Of Appeals For The Federal Circuit, 2010-1235, Reply Brief Of Appellants Hologic, Inc., CYTYC Corporation, And Hologic L.P.			704.00
FEDERAL EXPRESS			22.24
Subtotal			726.24
Sales Tax			42.24
Total Invoice Amount			768.48
Check No:			Payment Received
TOTAL			768.48

HOWREY
1299 Pennsylvania Ave. N.W.
Washington, DC 20004-2402

10/15/2010

1101023525 / 2000051325

101558

BYRON S. ADAMS
1615 L STREET, NW, STE 100
WASHINGTON DC 20036

USD *****2,499.19*

Please use check number 1101023525 to clear the items listed below on Howrey account 101558.

Invoice #	Our Doc.#	Invoice date	Amount	Comments
026220	1900065763	08/27/2010	2,499.19	
Total		USD	2,499.19	

DUPLICATE

OCT 15 2010

byron s. adams

1615 L Street N.W. #100
 Washington, DC 20036
 Corp. ID: 52-1335902
 Voice: (202) 347-8203
 Fax: (202) 837-7011

Invoice

Invoice Number:
026220
 Invoice Date:
8/27/10
 Page:
1

Client: HOWREY LLP
 1299 PENNSYLVANIA AVENUE, NW
 WASHINGTON, DC 20004

Re: HOLOGIC, INC., CYTYC CORP., &
 HOLOGIC L.P., Plaintiff-
 Appellants, v. SENORX, INC.,

BILL MANDEFRO

Client ID: HOWREY

Client PO	Payment Terms	Contact	Due Date
13938	Net 30 Days	BILL MANDEFRO	9/26/10
For Printing Services			Amount
20 copies - United States Court Of Appeals For The Federal Circuit, 2010-1235, Joint Appendix			2,327.60
FEDERAL EXPRESS			31.93
Subtotal			2,359.53
Sales Tax			139.66
Total Invoice Amount			2,499.19
Check No:			Payment Received
TOTAL			2,499.19

HOWREY
1299 Pennsylvania Ave. N.W
Washington, DC 20004-2402

06/30/2010

1101018607 / 2000037016

101146

CLICKS - DEPT 005
320 FT DUQUESNE BLVD, STE 300
PITTSBURGH PA 15222

USD *****10,454.07*

Please use check number 1101018607 to clear the items listed below on Howrey account 101146.

Invoice #	Our Doc.#	Invoice date	Amount	Comments
5200557	1900058057	04/21/2010	55.12	
5200735	1900058059	04/29/2010	10,398.95	
Total		USD	10,454.07	

MAILED

JUL - 1 2010

BY _____



INVOICE

1120 Connecticut Avenue NW, Suite 8-100
Washington, DC 20036
202-842-3430 • Fax: 202-842-4641

INVOICE NUMBER: 5200557

INVOICE DATE: 04/21/10

CUSTOMER ID: 5979

CLICKS W.O. NUMBER: 1205JPD

BILL TO: **Howrey LLP**
PURCHASER
1299 Pennsylvania Ave NW
Washington DC 20004

MAIN PHONE: 202-783-0800

CLIENT REFERENCE: 01990.00019

DIRECT PHONE: 202.383.7326

DELIVER TO: Billign Mandefro

DELIVERY TIME: 4:00 PM

NOTES:

DELIVERY DATE: 04/21/10

WHAT WE MADE FOR YOU

DEPT	DESCRIPTION	QUANTITY	DISCOUNTED COST EACH	DISCOUNTED TOTAL
V2	Converted PDF to tiff for I-Publish; Master CD price included	289 @	\$0.05000 =	\$14.45
T1	OCR	289 @	\$0.03000 =	\$8.67
T2	Endorsed bates number	289 @	\$0.02000 =	\$5.78
V3	Additional CD	2 @	\$8.95000 =	\$17.90

Thank You!

* INDICATES ITEM IS TAX EXEMPT

Payment terms are 30 Days

During this time, or during an additional 15-day grace period, the Discounted Total may be paid. After 45 days, the full Total of the invoice is due, and the unpaid balance shall bear interest at the rate of 1.5 percent per month or the highest rate permitted by law, whichever is lower. In any action taken to collect amounts due and owing to CLICKS, CLICKS shall be entitled to recover, and customer agrees to pay, CLICKS' counsel fees, including contingency fees, and costs of suit. Signature below acknowledges receipt of goods and/or services invoiced above and agreement to pay invoice balance under these terms.

DISCOUNTED SUBTOTAL: \$46.80

SALES TAX: \$3.12

for payment received ON or BEFORE 06/05/10
pay Discounted Total: **\$49.92**

for payment received AFTER 06/05/10
pay Total: **\$55.12**

5979
5200557

Please REMIT FROM THIS INVOICE to:

CLICKS - Dept 005
320 Ft Duquesne Blvd, Ste 300
Pittsburgh, PA 15222

Pay by credit card or other
payment questions: 800-776-9569

Marcus Uppe, Inc. dba CLICKS EIN: 25-1658622

20100421:RAY:1009 520 BAY

TIME DELIVERED:

4/21/10

X *Billign Mandefro*

HOWREY
1299 Pennsylvania Ave. N.W
Washington, DC 20004-2402

06/09/2010

1101017518 / 2000033988

101146

USD *****828.43*

CLICKS - DEPT 005
320 FT DUQUESNE BLVD, STE 300
PITTSBURGH PA 15222

Please use check number 1101017518 to clear the items listed below on Howrey account 101146.

Invoice #	Our Doc.#	Invoice date	Amount	Comments
5200484	1900053752	04/16/2010	828.43	
Total		USD	828.43	

M.A.C

Page 1 of 1



INVOICE

1120 Connecticut Avenue NW, Suite B-100
Washington, DC 20036
202-842-3430 • Fax: 202-842-4641

INVOICE NUMBER: 5200484

INVOICE DATE: 04/16/10

CUSTOMER ID: 5979

CLICKS W.O. NUMBER: 1508BAY

BILL TO: **Howrey LLP**
PURCHASER: 1299 Pennsylvania Ave NW
Washington DC 20004
CLIENT REFERENCE: 01990.0001

MAIN PHONE: 202-783-0800

DIRECT PHONE: 202.383.7326

DELIVER TO: **Bilign Mandefro**

DELIVERY TIME: 4:00 PM

NOTES:

DELIVERY DATE: 04/16/10

WHAT WE MADE FOR YOU

DEPT	DESCRIPTION	QUANTITY	DISCOUNTED COST EACH	DISCOUNTED TOTAL
V2	Convert PDFs to Tiffs for I-publish; Master CD price included	6,998 @	\$0.05000 =	\$349.90
T1	OCR	6,998 @	\$0.03000 =	\$209.94
T2	Endorsment	6,998 @	\$0.02000 =	\$139.96
V3	Additional CDs	3 @	\$8.95000 =	\$26.85
T4	Provided deliverables for I-Publish	1 @	\$50.00000 =	\$50.00

* INDICATES ITEM IS TAX EXEMPT

Payment terms are 30 Days

During this time, or during an additional 15-day grace period, the Discounted Total may be paid. After 45 days, the full Total of the invoice is due, and the unpaid balance shall bear interest at the rate of 1.5 percent per month or the highest rate permitted by law, whichever is lower. In any action taken to collect amounts due and owing to CLICKS, CLICKS shall be entitled to recover, and customer agrees to pay, CLICKS' counsel fees, including contingency fees, and costs of suit. Signature below acknowledges receipt of goods and/or services invoiced above and agreement to pay invoice balance under these terms.

DISCOUNTED SUBTOTAL: \$776.65

SALES TAX: \$51.78

for payment received ON or BEFORE 05/31/10 pay Discounted Total: **\$828.43**

for payment received AFTER 05/31/10 pay Total: **\$914.72**

5979
5200484

Please REMIT FROM THIS INVOICE to:

CLICKS - Dept 005
320 Ft Duquesne Blvd, Ste 300
Pittsburgh, PA 15222

Pay by credit card or other
payment questions: 800-776-9569

Marcus Uppe, Inc. dba CLICKS EIN: 25-1658622

20100514:BAY:1132
20100416:BAY:1656

8629 BAY

TIME DELIVERED:

X

CERTIFICATE OF SERVICE

I hereby certify that I have caused two true and correct copies of the
BILL OF COSTS of HOLOGIC, INC., CYTYC CORPORATION, and
HOLOGIC L.P., Plaintiffs-Appellants, to be served on this 10th day of
March 10, 2011, by Federal Express and electronic mail on:

Bruce R. Genderson, bgenderson@wc.com
Kannon K. Shanmugam, kshanmugam@wc.com
Aaron P. Mauer, amaurer@wc.com
WILLIAMS & CONNOLLY LLP
725 12th Street, N. W.
Washington D. C. 20005-5901

Attorneys for Defendant-Appellee SENORX, INC.



Matthew M. Wolf